

**Sukunan Waste Management and Sustainable Living Program:
Iswanto's Tour of Australian Best Practices, 4 March - 14 May 2006**

Iswanto is the primary leader and inspiration behind the Sukunan Program. He visited Australia to observe some of our best practices in waste management, sustainable living and environmental education. We also wanted him to share his ideas and experiences with Australians, and to create links between Indonesia and Australia.

Iswanto visited and observed practices and technologies for sustainable living, including:

- recycling, with a focus on the recycling of plastics,
- composting of organic waste, including composting toilets,
- river care,
- alternative energy (wind, water and solar),
- Permaculture, eco- communities and energy efficient building design,
- environmental education.

Iswanto often commented on his surprise at the lack of visible litter along Australian roads and in towns and cities, and by the extensive services provided by local governments for the management of waste. He was surprised to see the many social services and public amenities provided for the Australian public by governments, and often taken for granted.

Iswanto noted the sophisticated care that goes into waste management in comparison to Indonesia where waste is burned, thrown into rivers or dumped on disused land. He was impressed by the tremendous care taken with hazardous materials such as asbestos, batteries, paints, and other toxic substances. (These waste items often get no special care in Indonesia, or in most of the developing world). He observed that local government staff revealed a passion and enthusiasm for the careful handling of waste and were aware of its potential negative impacts on the environment and health.

While local governments often provided separate collection bins for biodegradable, recyclable and non-recyclable household waste, Iswanto was amazed to find that many highly educated, affluent citizens did not bother to separate their waste. Did this mean that successful, busy people have more important things to do than taking care of the environment?!

Iswanto noted the extensive efforts to keep pollutants out of rivers in Australia. In Indonesia cities look away from their polluted rivers which are still used as sewers, while in Australia rehabilitated rivers are becoming major recreational areas as communities restore their banks.

Rural Indonesians have taken for granted their deep and rich volcanic soil, while the growing urban population has lost touch with the value of soil. Iswanto realised that he had not taken into account the living microbes when selecting composting vessels for Sukunan which neglected to provide sufficient air for the aerobic bacteria. The septic tanks he had promoted did not allow for aerobic bacteria. Composting toilets, never used in Indonesia, could be used to return nutrients to the soil. Synthetic

fertilizers had until recently been so cheap that organic options were rarely considered.

In Australia Iswanto was surprised to encounter clean, friendly pigs in a pleasant environment and became keen to know how to make methane gas from their faeces! Pigs are normally viewed with antipathy by Muslims and seen as dirty animals.

Iswanto watched Australian children trying to identify all the bugs and grubs in soil. The idea of picking up soil and studying it as part of children's education never occurs in Indonesia.

Iswanto hopes to build in Sukunan an Environmental Education Centre with lessons learned from Ceres and Banyule Rethink Centre in Melbourne, Learnsapes in NSW and Wild Mountains in Queensland. He hopes to use the Biolytix system for grey and black water recycling, solar panels for electricity and efficient building design.

Waste Management

Northern Rivers Waste, Lismore City Council, Lismore NSW.

Landfill, leachate ponds, reed beds, sewage treatment plant, recycled goods shop. Met with Charlie Crethar, Lesley Trott, Phil Klepzig. Viewed and discussed latest waste management techniques. The tremendous care and protection that needs to be taken with hazardous materials such as asbestos, paints, poisons and batteries etc. Lesley.trott@lismore.nsw.gov.au , www.lismore.nsw.gov.au, ph: 02 6621 8890/0427 257 890

Waste 2006: 7th National Waste Management Conference, 28-31 March 2006, Waste Avoidance and Resource Recovery Conference, Coffs Harbour NSW. Theme "Practical solutions for Australia's Waste Managers", with case studies and useful tools and successful techniques being highlighted. www.impactenviro.com.au/waste2006

Waste Water Management

Darmananda Community, The Channon, NSW. Grease traps, settling ponds, reed beds, composting toilets. The critical importance of not allowing any waste water to reach the river. Dr. Leigh Davison, ldavison@scu.edu.au, www.ecotechnology.scu.edu.au, (02) 6620 3847 and "Terania Wastewater" Ray Flanagan, rayflanagan@nor.com.au, ph: 02 66886100

Eco Sewage Solutions, Lismore, NSW. Sewage and grey water designs, construction of the clivus maximus composting toilets. (Also advised how to build walls out of cement, sand, sawdust/Styrofoam at a ratio of 1:2:3) Sandy Thompson. sandyt@ceinternet.com.au, (02) 6689 7372

Biolytix Onsite Waste Treatment System, Malany QLD. Grey and black water systems which can convert sewage, wastewater, sanitary items and food scraps into

high quality irrigation water for the garden. Dean Cameron (winner of the Clunes Ross Award 2006). Offered to trial the Biolytix system in Sukunan. docam@biolyfix.com, www.biolytix.com, (07) 5435 2700, 0419 686 803, 1300 881 472

Composting

“Earthmakers”, Doon Doon, NSW. Robbie Green, the value of the plant Alovera and water hyacinth in composting and the importance of oxygen in the composting process, makes composting equipment for both small private and large commercial uses, info@earthmakers.com. www.Earthmakers.com (02) 66799070.

“O’Grady Rural”, Lismore, NSW. Ray O’Grady, Microbial Brewing/compost tea. Consultant for Soil Foodweb Institute, the importance of charcoal for soil fertility, rogrady@ceinternet.com.au, www.smartbugs.com.au, (02) 6621 6088 , 0429200492.

Soil Foodweb Institute, Lismore, NSW. Soil analysis, getting the balance right between bacteria and fungi, etc. Dr Elaine Ingham. soilfoodwebinst@aol.com, www.soilfoodweb.com.au, (02) 66225150.

Tryton Waste Services Pty Ltd, Lismore, NSW (worm farm) Biodegradeable materials from Lismore Council Waste converted into Worm castings and then a liquid fertilizer and pesticide. BarrieBlackman. engineering@tryton.com.au, www.tryton.com.au, (02) 66228855

Ceres, Community Environment Park, East Brunswick, Melb, VIC. Wormfarm Builder, demonstrated many types of composting bins / wormfarms and how to create methane gas from the faeces of pigs and cows, van@ceres.org.au, www.ceres.org.au, (03) 9387 2609 , 0425 724 640

Northern Rivers Waste, Lismore City Council, Lismore NSW. Display of many types of worm farms and composting containers, op cit.

Family home worm farms located in private gardens – Jill Sanguinetti, jill.sanguinetti@vu.edu.au, Marika and Oliver Mendelsohn, Melbourne, Marika.Vicziany@adm.monash.edu.au,

Recycling

Northern Rivers Waste, Lismore City Council, Lismore NSW. Recycling Shop. op.cit.

Waste 2006:Waste Avoidance and Resource Recovery Conference, Coffs Harbour NSW. op.cit.

Gecko – Gold Coast and Hinterland Environment Council, Gold Coast, QLD. NGO, recycled goods shop.

Banyule City Council Rethink Education Centre, Ivanhoe, Melbourne VIC. Waste separation plant – plastic, aluminium, paper, glass compacted and sent off to recycling industries. Recycled materials used for chairs, carpet and other furniture in

educational centre, Art and sculpture garden and rubber from car tyres, crushed and dried and used as recycled mulch and pebbles around plants. Maree Pollard – Rethink Centre Co-ordinator, maree.pollard @banyule.vic.gov.au, www.banyule.vic.gov.au, (03) 94327211, 0402132605

Our Planet Enterprises. East Brunswick, Melbourne, Jodie and Will Tait, Environmental Theatre, act, sing and educate about recycling, jodieandwill@ourplanet.com.au,

Corporate Recycling/Repeat Plastics. Manufacturing from recycled plastic waste – bollards, ramps, platforms, sign posts, piers, fences, pool walls, road barriers,. Carrum Downs, VIC. Peter Duffield. Email: peter@corporaterecycling.com.au, www.repeatrubber.com.au, (03) 9770 8384 / 0407 300 358

TP Recyclers (Thermoplastic Recyclers) – Manufactures Plastic Bags from plastic waste. Processors of Thermoplastic Wastes and Manufacturers of P.E. Film. Reservoir, VIC. –Ted Wardlaw. Email: thermoplastic@dodo.com.au, ph: 94623415
Gunter Hersburgh set up TP Recycling in Melbourne in the 1970s and now works as an Industrial Recycling consultant. (03) 9379 3504

River Care

Merri Creek Management Committee (MCMC), Brunswick, VIC. MCMC works with the community to preserve, restore and promote Merri Creek, its catchment and neighbouring regions as a vital living system of indigenous plants and animals. Weeding, composting and planting. Respect and honour of Indigenous people, plants, animals and water course. Creating a natural space in the city for exercise, natural beauty and recreation. Luisa Macmillan. admin@mcmc.org.au, www.mcmc.org.au, (03) 9380 8199, 9388 2821.

Alternative Energy

Rainbow Power Company Ltd, Nimbin, NSW. Solar, wind and hydro power technology displays, sales and education. Runs regular courses and offered members of Sukunan a free course on how to run solar successfully. Peter Pedals. pp@rpc.com.au, www.rpc.com.au,

Appropriate Technology Association (ATA), Melbourne VIC. Publishers of ReNew – environmental magazine, Environmental Shop sells items associated with sustainable living. Offered Sukunan some solar panels for its proposed Centre for Environmental Education. Placed an order for a 100 of Sukunan's handbags made from recycled food/snack satches. Taught Iswanto about marketing Sukunan's handbags and the prices he could expect. Michael Harris. Michael.harris@ata.org.au, www.ata.org.au, (03) 9639 1500, M: 0409 199 450

Energy Efficient House Design

The Green Building, 60 Leicester St, Melbourne. Guided tour of an office building housing Melbourne's major environmental NGOs – ACF, Solar, Water, Environment Victoria. The building located in the middle of Melbourne's CBD demonstrates

passive solar design, natural lighting, vertical and horizontal ventilated, little use of air conditioning, its own water collection tanks and integrated black and grey water recycling system, solar panels which feed into the grid, Andrew Gemmell, Building Manager. buildingmgr@60Lgreenbuilding.com, www.60Lgrenbuilding.com, (03) 0347 6033, M: 0429 351 060

Permaculture

Djanbung Gardens Permaculture Centre. Nimbin, NSW. Permaculture education and demonstration centre: organic gardens, orchards, tropical fruit forest and bushfoods. Revealed that pigs did not smell if they were kept in clean conditions and treated well. Many varieties of bamboo, respect for bamboo as a building material. Robyn Francis. robyn@permaculture.com.au, www.earthwise.org.au, (02) 6689 1755, M: 0429 147 138

Hepburn Permaculture Gardens, Dalesford, VIC. Demonstrating sustainable living in architecture and permaculture garden based on the principles of Bill Mollison – founder of the Permaculture movement together with David Holmgren. homgren@netconnect.com.au (03) 53483636, www.spacountry.net.au/holmgren.

Eco-Village, Currumbin Valley, QLD. Early stages of an environmentally sustainable community.

Environmental Educational

Wild Mountains, via Rathdowney, QLD. Educational programs to inspire people to lead more environmentally aware lifestyles. Located in a wilderness area adjacent to the Border Ranges National Park. Jill McVilly, Richard Zoomers. Info@wildmountains.org, Joan.mcvilly@wildmountains.org, www.wildmountains.org. (07) 5544 1377

Many of its ideas are from the Institute for Earth Education. www.eartheducation.org, ieeaust@adam.com.au, M: 0882617768 (Honor)

Learnsapes Planning and Design, Yamba, NSW. Helping children design their own school grounds. Helen Tyas-Tunggal. helent@nor.com.au. (02)6646 1844, 0412914906.

Ceres, Community Environment Park, East Brunswick, Melbourne. Children's environmental education with comprehensive, integrated, interactive displays of techniques and technologies for sustainable living. Judy Glick www.ceres.org.au, (03) 9387 2609, 93874472

Port Phillip Eco Centre, St.Kilda, Melbourne. Geoffrey Barry. www.ecocentre.com. (03) 9534 0670, M: 0425 844 377

Banyule City Council Rethink Education Centre, Ivanhoe, Melbourne. Maree Pollard, Centre Co-ordinator, maree.pollard@banyule.vic.gov.au, www.banyule.vic.gov.au, (03)94327211, M: 0402132605.

Northern Rivers Waste, Lismore City Council, Lismore NSW.

Waste management education. op.cit.

Gecko. Environmental education and activist NGO, Gold Coast, QLD.

Our Planet Enterprises, East Brunswick, Melbourne, Jodie and Will Tait, Environmental Theatre, act/sing and educate about recycling, jodieandwill@ourplanet.com.au, (03) 8300 0896, M:0425 737 146

Cleaning Melbourne's Streets (Smelbourne) at City Gallery, Melbourne Town Hall

Presentations to Universities, Radio, NGOs

- Byron Bay FM, Environment Show, 10th March contact person Terrie Wells (Red Terra) redterra@bayfm.org, (02)66807999
- Australian Indonesia Arts Alliance, Byron Bay, 10th March, contact person Judy Shelley, aiaa@aiaa.org.au, www.aiaa.org.au, (02) 6685 7789, M 0405 463 663
- Centre for Eco-technology, Southern Cross University, Lismore, 14th March, contact person Dr. Leigh Davison op.cit
- Sustainable Futures Australia, Byron Bay, 14th March, contact person Stephanie Long, stephanie.long@foe.org.au, (02) 6685 7198
- Wild Mountains, 16th March, op cit.
- Siddha Farm, Nimbin, 18th March, Dave and Dorothy Highett, (02) 66891535
- Sustainability Research Institute, Byron Bay, 19th March, contact person Dudley Legget, sri@nrg.com.au, (02) 66 853719
- Nimbin FM, Environment Show, 25th March contact person Peter Pedals, op.cit
- Dorrigo FM, Portraits of People, 28th March contact person Helen Proud, proudhelen@hotmail.com, (02) 6657 2630,
- Monash Asia Institute and Centre for Southeast Asian Studies, Monash University, Melbourne, 6th April organized by Marika Vicziany and Juliet Yee, Op.cit Marika.Vicziany@adm.monash.edu.au
- Board Members of Finkel Foundation, 6th April, Ella and Alan Finkel,
- Radio Australia, ABC – Connect Asia, 7th April, contact person Sen Lam, lam.sen@abc.net.au, www.radioaustralia.net.au, (03) 96261875
- SBS Radio, 7th April, contact persons Sri Dean, (03) 99492208, M: 0400981119 and Bela Kesuma
- Australian Volunteers International (AVI), Melbourne, 11th April organized by Dimity Fifer, DFifer@australianvolunteers.com, (03) 9279 1701, M:0403115 782,
- Victoria University, Melbourne, 11th April, contact person Jill Sanguinetti, op.cit
- World Vision, 12th April, contact persons Paul Ronalds, Director policy and program, paul.ronalds@worldvision.com.au (03) 9287 2955, M: 0417 137 711, Jules Frost Manager Tsunami Working Group Policy and Programs, (03) 9287 2428, M:0413 027 694
(03) 9909 9104
- Geraldine Doogue's Saturday Breakfast Program, 15th April contact person Katherine Golan, gollan.katherine@abc.net.au
- Women on the Line, Community Radio, 3CR, 24th April contact person Sarah L'Estrange, sarahlestrange@yahoo.com.au, M: 0402 727 042, www.womenontheline.org.au, www.3cr.org.au
- Indonesian Consulate, 24th April contact persons Consul General Wahid Supriyadi, mwahids@yahoo.com, (03) 95252755, M:0400668984, Ratna Harjana, Vice Consul,

Jahar Gultom, Consul, Totok Yudiadnanto, Information, Culture and Social Affairs Officer

- Australian International Health Institute, The University of Melbourne, 24th April
Prof. Emeritus Sir Gustav Nossal –Department of Pathology and Dr. Krishna Hort, khort@unimelb.edu.au
- Australian Volunteers Abroad, Op.cit. contact person Nicky Lumb, Country Manager – Indonesia, nlumb@australianvolunteers.com, M: 0812 107 9582. Tel/Fax 021 5737379, www.australianvolunteers.com
- Victorian Humanist Society, Balwyn, Melbourne, 27th April, contact person Stephen Stuart, SNStuart@msn.com, (03) 98578318
- St.Kilda Eco-Centre, 28th April, contact person Geoffrey Barry, Julian Donlan
- Rotary Alexandra, Alexandra, VIC 3rd May, contact person David Strongman, david.strongman@transcare.net.au, (03) 5774 2958, M: 0412 269 637,
- Acheron Valley Landcare Group, 6th May contact person Rita Rita Seethaler, rita.seethaler@tuti.com.au
- Borderlands, Melbourne, contact person Jacque Boulet, 8th May - community development and social work - (building fairer communities – community development, social organization and ecologically sustainable development.)